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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/697,096	10/31/2003	Bruno Devos	DEVO3004/JEK	9002
23364	7590	06/19/2007		
BACON & THOMAS, PLLC 625 SLATERS LANE FOURTH FLOOR ALEXANDRIA, VA 22314			EXAMINER NGUYEN, JIMMY H	
			ART UNIT 2629	PAPER NUMBER
			MAIL DATE 06/19/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/697,096	Applicant(s) DEVOS ET AL.	
	Examiner Jimmy H. Nguyen	Art Unit 2629	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 04 May 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-5, 7-15 and 17-21 is/are rejected.
- 7) ☒ Claim(s) 6 and 16 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/30/2007 has been entered. Claims 1-21 are currently pending in the application. An action follows below:

Claim Objections

2. Claim 2 is objected to because of the following informalities: -- said -- should be inserted immediately before "digitizer" in line 3, in order to clarify the claimed invention. Appropriate correction is required.

3. Claim 7 is objected to because of the following informalities: -- digitized -- should be inserted immediately before "control data" in line 2 because claim 1 is amended to recite the sub-display or the control unit receiving the **digitized** control data and video signals (but not the control data and video signals). Appropriate correction is required.

4. Claim 14 is objected to because of the following informalities: "Control unit for use in a configurable large-area display system according to claim 1, said control unit configured as a sub-display comprising" in lines 1-3 should be changed to -- Configurable large-area display system according to claim 1, wherein said control unit configured as a sub-display comprises --, in order to clarify the claimed invention. See any of claims 5 and 9. Appropriate correction is required.

Art Unit: 2629

5. Claim 15 is objected to because of the following informalities: "Control unit according to claim 14, including" in line 1 should be changed to -- Configurable large-area display system according to claim 14, wherein said control unit further comprises --, in order to clarify the claimed invention. See the objection to claim 14 above. Further, -- the digitized -- should be inserted immediately before "control data" in line 2 because claim 1 is amended to recite the sub-display or the control unit receiving the **digitized** control data and video signals (but not the control data and video signals). Appropriate correction is required.

6. Claim 16 is objected to because of the following informalities: "Control unit according to claim 15" in line 1 should be changed to -- Configurable large-area display system according to claim 15", in order to clarify the claimed invention. See the objection to claim 14 above.

Appropriate correction is required.

7. Claim 17 is objected to because of the following informalities: "Control unit according to claim 15" in line 1 should be changed to -- Configurable large-area display system according to claim 15 --, in order to clarify the claimed invention. See the objection to claim 14 above.

Further, -- digitized -- should be inserted immediately before "control data" in line 2 because claim 1 is amended to recite the sub-display or the control unit receiving the **digitized** control data and video signals (but not the control data and video signals). Appropriate correction is required.

8. Claim 18 is objected to because of the following informalities: "Control unit according to claim 14" in line 1 should be changed to -- Configurable large-area display system according to claim 14", in order to clarify the claimed invention. See the objection to claim 14 above.

Appropriate correction is required.

Art Unit: 2629

9. Claim 19 is objected to because of the following informalities: "Control unit according to claim 14" in line 1 should be changed to -- Configurable large-area display system according to claim 14", in order to clarify the claimed invention. See the objection to claim 14 above.

Appropriate correction is required.

10. Claim 20 is objected to because of the following informalities: -- the digitized -- should be inserted immediately before "video signal" in lines 7 and 8 because claim 1 is amended to recite the sub-display or the control unit receiving the **digitized** control data and video signals (but not the control data and video signals). Appropriate correction is required.

Claim Rejections - 35 USC § 112

11. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

12. Claims 12, 13, 20 and 21 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 12 and 13 recite the limitation "the modules" in line 2. There is insufficient antecedent basis for this limitation in the claims.

Claim 20 recites the limitations, "each module" in lines 5 and 7 and "the pixel clusters" in line 8. There is insufficient antecedent basis for these limitations in the claim.

As to claim 21, since this claim depends upon claim 20, this claim is therefore rejected for the same reason set forth in claim 20 above. Further, this claim recites a feature, "wherein depending on the desired spacing, some intermediate pixels, which are not sufficiently far apart to have the appearance of being a transparent structure, are ignored for use". The specification

Art Unit: 2629

does not provide a **standard for a desired spacing between intermediate pixels** so that some intermediate pixels, which are **not sufficiently far apart** to have the appearance of being a transparent structure, are ignored for use, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.

Claim Rejections - 35 USC § 102

13. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

14. Claims 1, 2, 11-14, 18, and 19 are rejected under 35 U.S.C. 102(b) as being anticipated by Maskeny (US 5,990,802).

As to claims 1, 11, 14 and 19, the claimed invention reads on the Maskeny reference as follows: Maskeny discloses a configurable large-area display system (a system 42, see Fig. 7, col. 2, line 37) comprising a display (a display including modules 12 as shown in Fig. 1) including a plurality of sub-displays or control units (12) (see Fig. 1), each containing an array of LED pixels (LEDs 16, Fig. 1, col. 4, line 14); a central controller hardware and software block (a computer (see Fig. 6) containing software to control the display system (42) and to generate control data and video signals to be displayed on the display (see col. 8, lines 32-47); and a digitizer (a microcontroller 20, see Figs. 1 and 6) converting said control data and video signals to a digital signal compatible with the display (see col. 5, lines 16-38); wherein the digitized control data and video signals are passed from one sub-display (12) to the next (see Fig. 4, col. 5, lines 64-66) and each sub-display or control unit (12) is capable of controlling the individual

Art Unit: 2629

pixels (122) of said control unit (12) as a function of position within the display and of the received control data and video signals (see col. 2, line 56 to col. 3, line 5, and col. 6, line 59 through col. 7, line 23). Maskeny further teaches each sub-display or control unit (12) comprising 4 pixel clusters (Fig. 1 shows each pixel cluster comprising 4 groups of LEDs and associating with a latch driver IC 14) and each cluster including 4 pixel modules which are sequentially interconnected with each other and each containing an array of 4 LEDs (16). Accordingly, all the limitations of these claims are read in the Maskeny reference.

As to claim 2, Maskeny discloses the central controller hardware and software block (a computer) electrically connected digitizer (20) via a standard RS-232 connection (see Fig. 6, col. 6, lines 46-53, and col. 8, lines 48-50).

As to claim 12, Maskeny implicitly discloses that dimensions of the modules are relatively small, such that they can be assembled form displays having any 2D shape (see Figs. 1 and 7).

As to claim 13, Maskeny implicitly discloses that the modules of the display are arranged in a standalone manner so that the display apparently has transparent structure (see Fig. 1).

As to claim 18, Maskeny discloses the controller (216) provided with means for managing the pulse width modulation associated with driving pixels (16) of each module (see col. 11, lines 21-55).

Claim Rejections - 35 USC § 103

15. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made

Art Unit: 2629

to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

16. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Maskeny and further in view of Fiber Options (2210D RS 232 data single -mode fiber, cited in IDS filed on 05/13/2004).

As to claim 3, Maskeny further discloses the digitizer (20) connected to the display (12s) by connection means as shown in Fig. 4; however, Maskeny does not expressly teach the connection means being means of a fiber link, as presently claimed. However, Fiber Options expressly teaches that the benefit of using a single-mode fiber 2210D in the data transmission system is to make the system extremely versatile and easy to use. Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention was made to utilize the fiber in the Maskeny system, in view of the teaching in the Fiber Options, because this would provide a system extremely versatile and easy to use, as taught in the Fiber Options reference.

17. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Maskeny and further in view of Toshiba America Information Systems (Summary of RS-232, RS 422, and RS-485 Interface Standards, cited in IDS filed on 05/13/2004), hereinafter Toshiba.

As to claim 4, as discussed in the rejection to claim 1 above, Maskeny discloses all the claimed limitations of this claim except that Maskeny does not disclose expressly that, in the event that the distance between two successive control units (12) exceeds a predetermined distance, an intermediate resyncer is used between said two control units (12) to receive and retransmit the control data and video signals. However, Toshiba expressly teaches that in the event that the distance between multiple drivers and multiple receivers (i.e., two control units) exceeds a predetermined distance, a RS-485 interface (i.e., the claimed intermediate resyncer) is

Art Unit: 2629

used between multiple drivers and multiple receivers to receive and retransmit the control data and video signals. Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention was made to provide a RS-485 interface in the Maskeny system, in the event that the distance between two successive control units (12) exceeds a predetermined distance, in view of the teaching in the Toshiba reference, because this would provide a system with noise immunity, as taught in the Toshiba reference.. Further, see the Toshiba reference for more benefits of using a RS-485 interface.

18. Claim 5, 7-10, 15, and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Maskeny.

As to claims 5 and 15, Maskeny further discloses the control unit (12) including a voltage regulator (18) for generating +5V DC voltage to drive the circuits and LEDs (see Fig. 4, col. 4, lines 20-21 and lines 45-51), a resynchronizer unit (a unit including connections and nodes between two control units 12 as shown in Fig. 4) to receive and to transmit data, and a controller (a controller including 4 driver ICs 14, see Fig. 4) driving 4 pixel clusters that each includes 4 modules, each module containing an array of 4 LEDs 16 (see Figs. 1 and 4). Maskeny further teaches that the control unit (12) including means for storing different selected data for future use (see claim 17). Accordingly, Maskeny discloses all the claimed limitations of this claim except that Maskeny uses a voltage regulator and storing means, instead of an AC-to DC power supply and an EEPROM as presently claimed. However, Official Notice is taken that both the concept and the advantages of using an AC-to-DC power supply in a computerized system to avoid the use of charged power supply such as a battery, which limits the computerized system to be operated in a limited period, are well-known and expected in the art. Further, Official Notice is

Art Unit: 2629

taken that both the concept and the advantages of using an EEPROM in a computerized system to remain the data even the system powered off are well-known and expected in the art.

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention was made to replace a voltage regulator and storing means of Maskeny with an AC-to-DC power supply and an EEPROM, because this would allow a use the system to be operated in a longer period and to avoid the lost of data when the system is turned off.

As to claims 7 and 17, the Maskeny controller (14s) inherently contains algorithms parse the control data and video signals received specific packets associated with the location given module within concerned control unit of display system, in order to drive properly each LED (16) in the display system.

As to claim 8, see the rejection to claim 18 above.

As to claim 9, as discussed in the rejection to claims 1, 11, 14 and 19 above, Maskeny further teaches each sub-display or control unit (12) comprising 4 pixel clusters and each cluster including 4 pixel modules which are sequentially interconnected with each other and each containing an array of 4 LEDs (16). Accordingly, Maskeny discloses all the claimed limitations except that Maskeny cluster contains four modules instead of 32 modules as presently claimed. While Maskeny may not exemplify particular number of modules as presently claimed; however, one of ordinary skill in the art would have been found it obvious to modify the cluster of Maskeny to contain 32 modules in accordance with a particular application. Furthermore, since Applicants have not disclosed the particular number of modules to solve any other problem, to provide other advantage, or to be used for any other purpose, the difference between the number of modules in the Maskeny reference and that of claim 9 is a mere change in the number of

Art Unit: 2629

modules. Therefore, one of ordinary skill in the art would have found it obvious to modify the number of modules in the Maskeny cluster as desired as was judicially recognized in re Rose, 105 USPQ 237 (CCPA 1955).

As to claim 10, as discussed in the rejection to claims 1, 11, 14 and 19 above, Maskeny also teaches each module comprising an array of 2x2 pixels (16) (see Fig. 1).

19. Claims 1-3, 5, 7-15 and 17-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ogino et al. (US 6,593,902 B1), hereinafter Ogino.

As to claims 1-3 and 11, the claimed invention reads on the Ogino reference as follows: Ogino discloses a configurable large-area display system (see Figs. 1 and 12) comprising a display (a display apparatus 100/400; see Figs. 1 and 12) including a plurality of sub-displays or control units (display units 101; see Figs. 1 and 12), each containing an array of LED pixels (see Figs. 2A and 3; col. 4, lines 31-43); a central controller hardware and software block (a block including elements 200 and 300 of Fig. 1 or 500 of Fig. 12) containing software to control the display system and to generate control data and video signals to be displayed on the display (see col. 11, lines 27-43); wherein the control data and video signals are passed from one sub-display (101) to the next (see col. 4, line 44 through col. 5, line 7) and each sub-display or control unit (101) is capable of controlling the individual pixels of said control unit (101) as a function of position within the display and of the received control data and video signals (see col. 6, line 55 through col. 10, line 67 and col. 12, line 5 through col. 13, line 67). Accordingly, Ogino discloses all the claimed limitations of claim 1 except for a digitizer connected to the central controller hardware and software block by means of a standard RS-232 connection and to the display by means of a fiber link. Official Notice is taken that both the concept and the advantages

Art Unit: 2629

of providing a digitizer connected to the central controller hardware and software block by means of a standard RS-232 connection and to the display by means of a fiber link, for converting any video signal to a digital format that can be display by LED display system are well-known and expected in the art. Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention was made to provide a digitizer in the display system of Ogino because this would allow the display system capable of receiving any type of video signal as generally recognized by a person of ordinary skill in the art.

Note that the well-known digitizer with connecting means may be found in the pending application, page 7, line 13 through page 8, line 13 and the below cited reference (Tsuji, US 7,019,723; col. 17, lines 46-50).

As to claims 14 and 19, as noting in Fig. 2A, Ogino teaches each control unit (101) including a plurality of pixel clusters that each may include a plurality of modules, each module containing an array of light-emitting pixel elements (102).

As to claims 5 and 15, as noting in Figs. 2A and 2B, Ogino teaches each control unit (101) including a resynchronizer unit (105, 106) to receive and transmit data, a memory (104), and a controller (103) driving a plurality of pixel clusters that each may include a plurality of modules, each module containing an array of light-emitting pixel elements (102). Ogino further teaches the control unit using the power form a power supply unit (200) (see Fig. 1).

Accordingly, Ogino fails to teach the memory (104) being an EEPROM and each control unit comprising an AC-to-DC power supply. However, as Examiner acknowledge that the memory (104) being an EEPROM and each control unit comprising an AC-to-DC power supply are not a required for the pending invention, but merely an obvious matter design choice. Therefore, one

of ordinary skill in the art would have been found it obvious to utilize the EEPROM for the Ogino memory in order to maintain the stored data even when the power of the system is off and to provide an AC-to-DC for each control unit of Ogino in order to individually provide the power supplied to each control unit.

As to claim 12, Ogino implicitly discloses that dimensions of the modules are relatively small, such that they can be assembled form displays having any 2D shape (see Figs. 1 and 12).

As to claim 13, Ogino implicitly discloses that the modules of the display are arranged in a standalone manner so that the display apparently has transparent structure (see Figs. 1 and 12).

As to claims 7 and 17, the Ogino controller (103) inherently contains algorithms parse the control data and video signals received specific packets associated with the location given module within concerned control unit of display system, in order to drive properly each LED (16) in the display system (see col. 6, line 55 through col. 9, line 9).

As to claims 8 and 18, LED pixel driven by the pulse width modulation is well-known and expected by one of ordinary skill in the art.

As to claims 9 and 10, Ogino discloses all the claimed limitations except that Ogino does not disclose the control unit comprising four pixel clusters, each cluster containing 32 modules, and each module comprising an array of 2x2 pixels, as presently claimed. While Ogino may not exemplify particular number of clusters, modules and pixels in an array, as presently claimed; however, one of ordinary skill in the art would have been found it obvious to modify the display of Ogino comprising four pixel clusters, each cluster containing 32 modules, and each module comprising an array of 2x2 pixels, in accordance with a particular application. Furthermore, since Applicants have not disclosed the particular number of modules to solve any other

Art Unit: 2629

problem, to provide other advantage, or to be used for any other purpose, the difference between the number of clusters, modules or pixels in an array, in the Ogino reference and that of these claims is a mere change in the number of clusters, modules and pixels in an array. Therefore, one of ordinary skill in the art would have found it obvious to modify the number of clusters, modules and pixels of an array, in the Ogino display as desired as was judicially recognized in re Rose, 105 USPQ 237 (CCPA 1955).

20. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ogino, and further in view of Toshiba America Information Systems (Summary of RS-232, RS 422, and RS-485 Interface Standards, cited in IDS filed on 05/13/2004), hereinafter Toshiba.

As to claim 4, as discussed in the rejection to claim 1 above, Ogino discloses all the claimed limitations of this claim except that Ogino does not disclose expressly that, in the event that the distance between two successive control units (12) exceeds a predetermined distance, an intermediate resyncer is used between said two control units to receive and retransmit the control data and video signals. However, Toshiba expressly teaches that in the event that the distance between multiple drivers and multiple receivers (i.e., two control units) exceeds a predetermined distance, a RS-485 interface (i.e., the claimed intermediate resyncer) is used between multiple drivers and multiple receivers to receive and retransmit the control data and video signals. Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention was made to provide a RS-485 interface in the Ogino system, in the event that the distance between two successive control units exceeds a predetermined distance, in view of the teaching in the Toshiba reference, because this would provide a system with noise immunity, as

Art Unit: 2629

taught in the Toshiba reference.. Further, see the Toshiba reference for more benefits of using a RS-485 interface.

Allowable Subject Matter

21. Claims 6 and 16 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

22. The following is a statement of reasons for the indication of allowable subject matter: the claimed invention is directed to a configurable large-area display system. Claims 6 and 16 identify the uniquely distinct feature, “each module contains a local storage device to store production data and factory light output measurements, as well as color coordinates for each pixel within each module”. The closest prior arts, Maskeny and Ogino both discussed above, either singularly or in combination, fail to anticipate or render the above underlined limitations obvious.

Response to Arguments

23. Applicant's arguments filed 05/04/2007 have been fully considered but they are not fully persuasive.

With respect to the claim objection to claim 1 in the Office action dated 12/04/2006, the objection has been withdrawn in light of the amendment to claim 1.

24. With respect to the claim objection to claims 14-19 in the Office action dated 12/04/2006, Applicants argue that claims 14-19 direct to a control unit intended for use in the display system of claim 1 and the display system according to claim 1 is the preamble; see page 7 of the amendment. Examiner disagrees because a preamble is generally not accorded any patentable

weight where it merely recites the purpose of a process or the intended use of a structure, and where the body of the claim does not depend on the preamble for completeness but, instead, the process steps or structural limitations are able to stand alone. See *In re Hirao*, 535 F.2d 67, 190 USPQ 15 (CCPA 1976) and *Kropa v. Robie*, 187 F.2d 150, 152, 88 USPQ 478, 481 (CCPA 1951). In the instant application, all the limitations of independent claim 1 have been given patentable weight. Accordingly, the objections to claims 14-19 are maintained.

With respect to the rejection under 35 USC 112, first paragraph, to claims 6, 16, 20 and 21, in the Office Action dated 12/04/2006, these rejections have been withdrawn in light of the amendment to claims 6, 16 and 20.

With respect to the rejection under 35 USC 112, second paragraph, to claim 21 in the Office Action dated 12/04/2006, see the new rejection above.

With respect to the rejection under 35 USC 102(b) as being anticipated by Maskeny, in the Office Action dated 12/04/2006, Applicants argue "According to the present invention, each control unit is given a vertical and horizontal start position control (see page 18, line 31 to page 19, line 1 of the present application), and the video signals are controlled as a function of the position of the control units, and hence as a function of the position of each of the individual pixels (see page 4, lines 27-31 of the present application). Thus, the present invention is concerned with the actual, physical position of the control unit within the display"; see page 9, last paragraph to page 10, line 3. In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., each control unit is given **a vertical and horizontal start position control** and the video signals are controlled as a function of the position of the control units, and hence as a

Art Unit: 2629

function of the position of each of the individual pixels) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

Conclusion

25. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Tsuji (US 7,019,723 B2; see Figs. 1-4) discloses a related configurable large-area display system (see Figs. 1-2) comprising a display (10) including a plurality of sub-displays or control units (10b), each containing an array of LED pixels (col. 9, lines 45-63); a central controller hardware and software block (11, 12); and a digitizer (a CU1; see Fig. 3, 17, lines 46-50).

26. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jimmy H. Nguyen whose telephone number is 571-272-7675.

The examiner can normally be reached on Monday - Friday, 6:30 a.m. - 3:00 p.m..

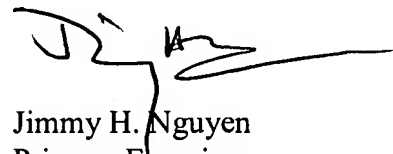
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bipin Shalwala can be reached at 571-272-7681. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR

Art Unit: 2629

system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

JHN
June 11, 2007

A handwritten signature in black ink, appearing to read 'JH Nguyen', with a long horizontal line extending to the right.

Jimmy H. Nguyen
Primary Examiner
Technology Division: 2629